

FIG. 2A

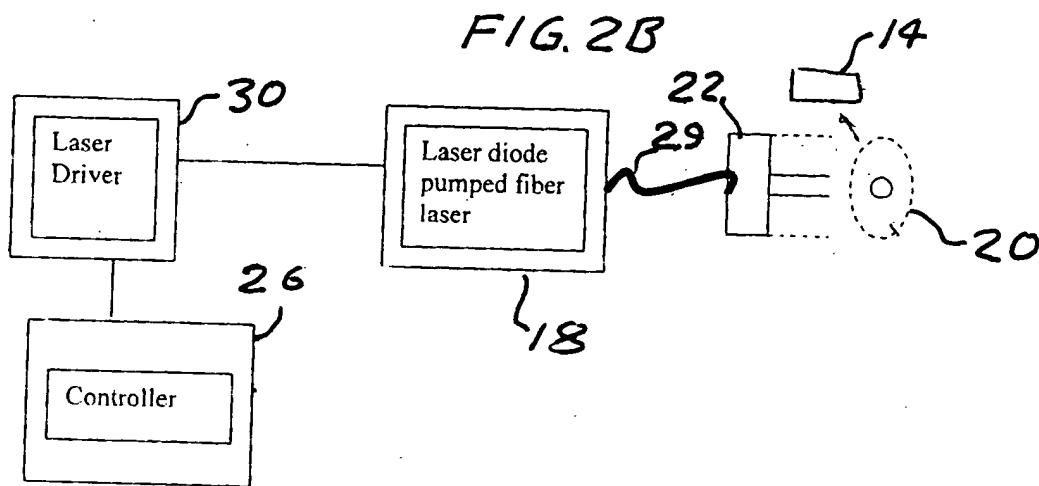


FIG. 2B

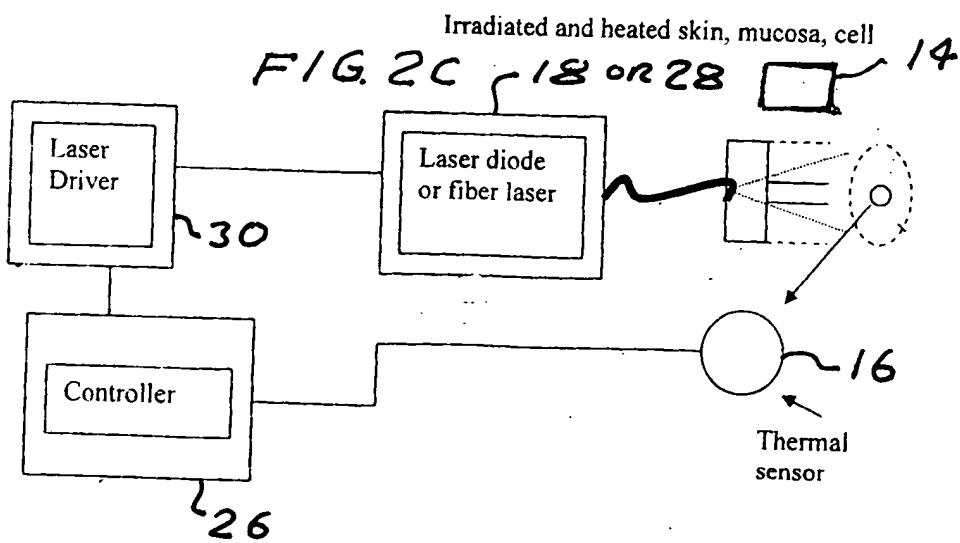


FIG. 2C

Irradiated and heated skin, mucosa, cell

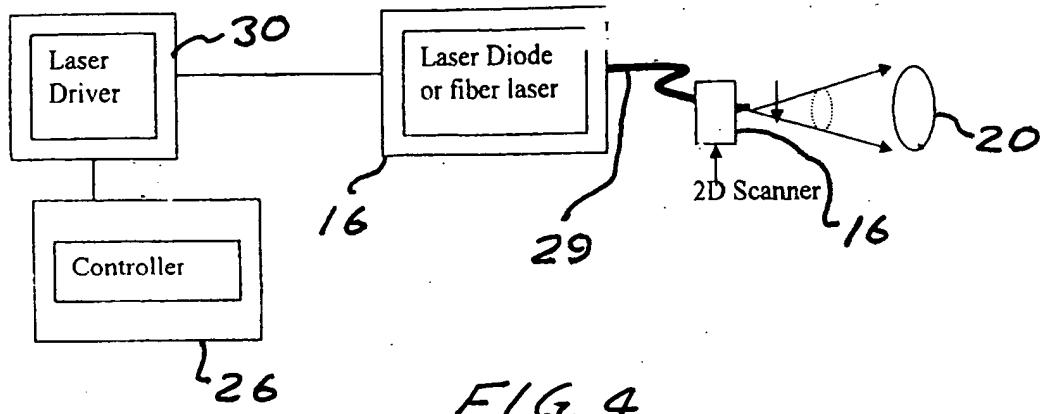


FIG. 4

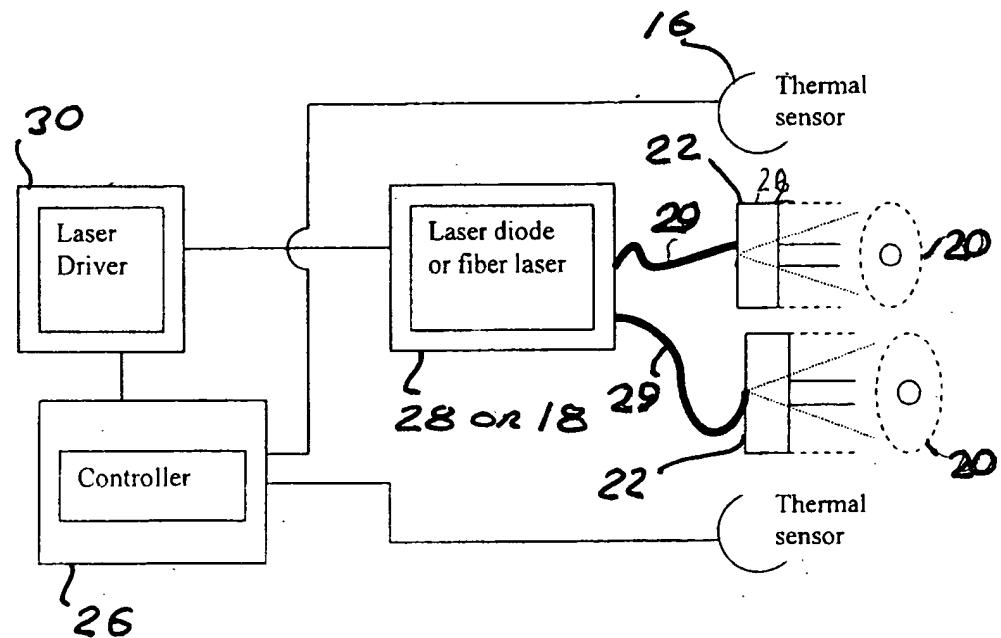


FIG. 5

FIG. 6A

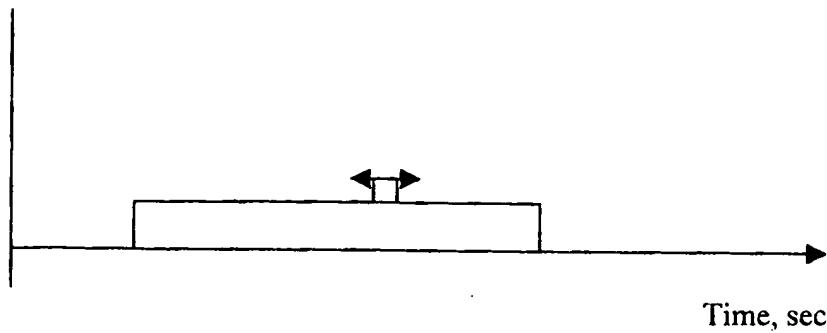


FIG. 6B

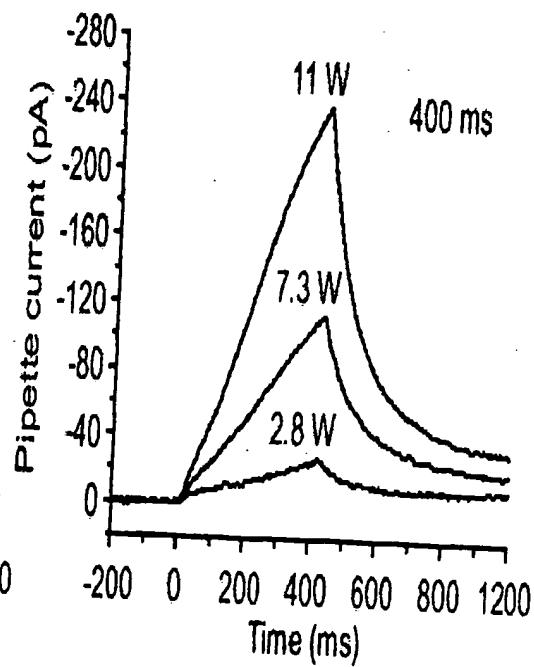
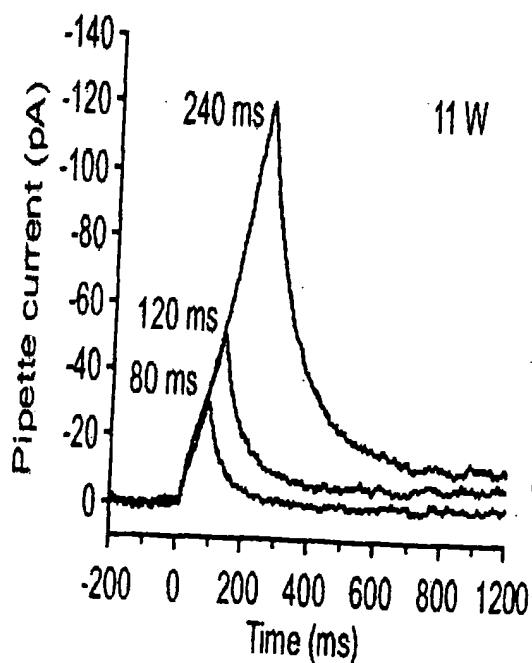
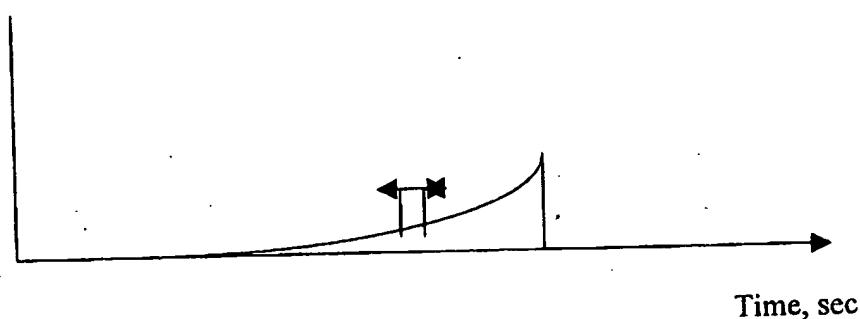


FIG. 7A

FIG. 7B

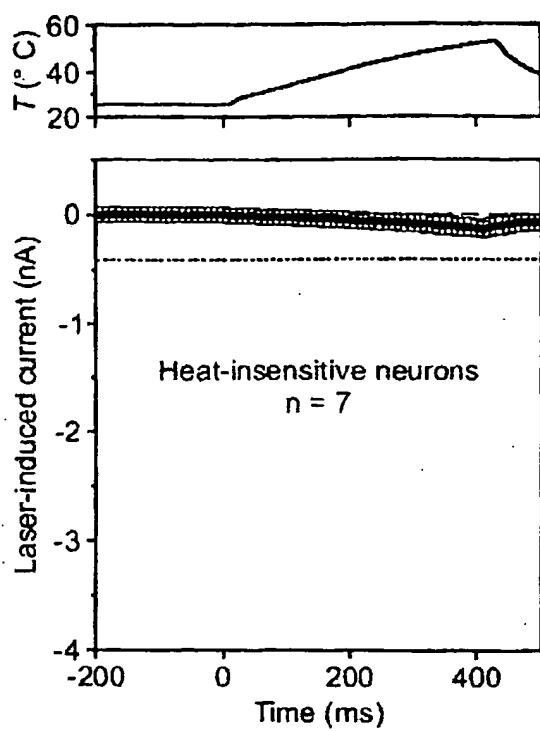


FIG. 8A

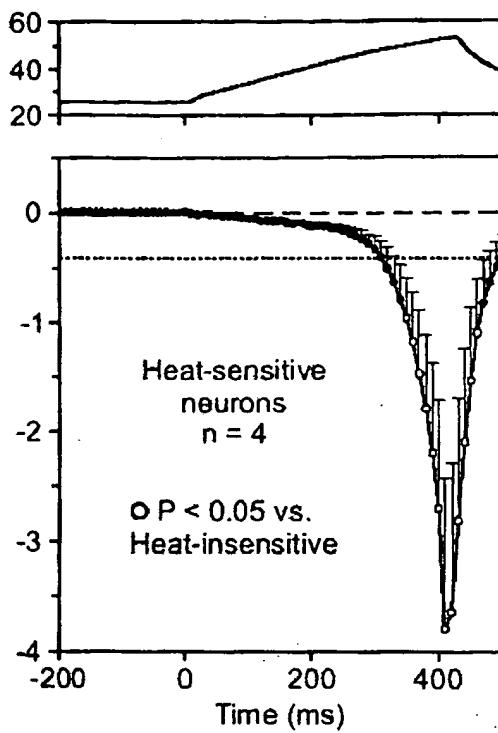
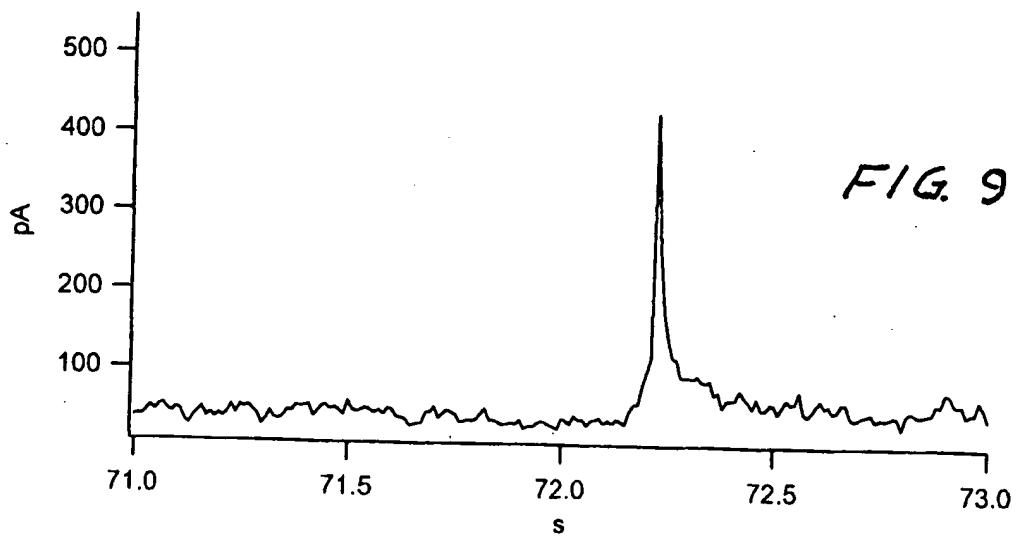
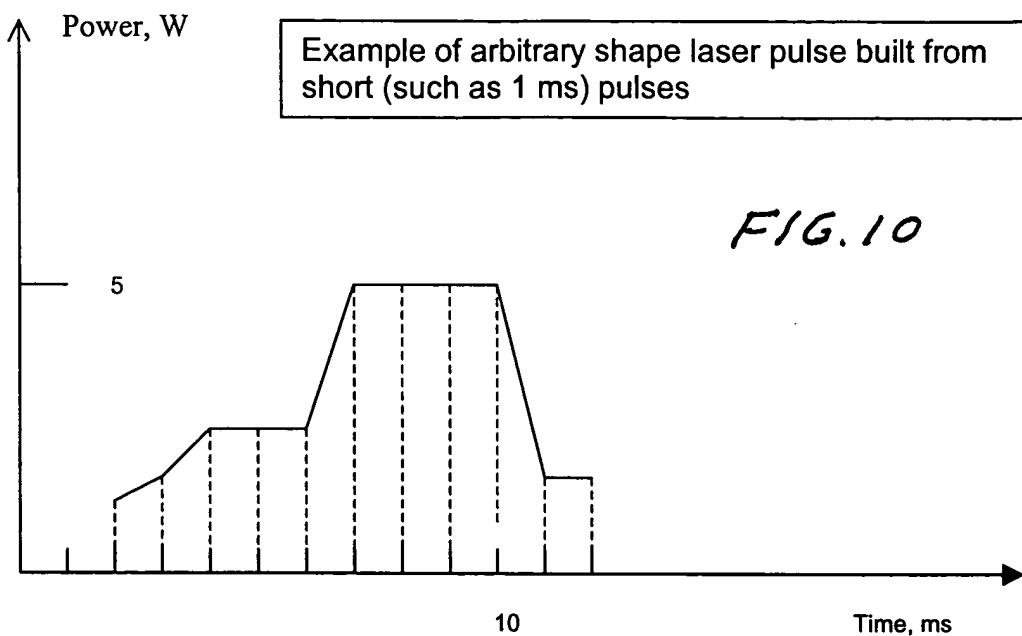


FIG. 8B





Example of standard square wave laser pulses:

A) Single pulses such as: 1 ms – 60 sec

FIG. 11

Power, W	Pulse duration, ms	Irradiated diameter, mm	Energy, mJ	Energy density, mJ/mm ²	Power density, W/mm ²
20	10	1	200	255	25.5
16	20	1	320	408	20.4
10	50	1	500	637	12.7
2	500	1	1000	1274	2.5
10	200	2.5	2000	408	2.0
3.5	300	2.5	1050	215	0.7
2	500	2.5	1000	204	0.4
1.5	1000	3	1500	212	0.2
1.2	2000	3	2400	340	0.17
1.1	20000	5	22000	1121	0.06

Number of Pulses	Power, W	Pulse Duration, ms	Irradiated area, mm	Interval between pulses, sec	Energy, mJ	Energy density, mJ/mm ²
100	2.5	50	2	0.35	125	39.8
25	5	300	7	3	1500	39
100	10	50	1	60	500	636.9
40	1.5	80	2	0.15	120	38.2

FIG. 12

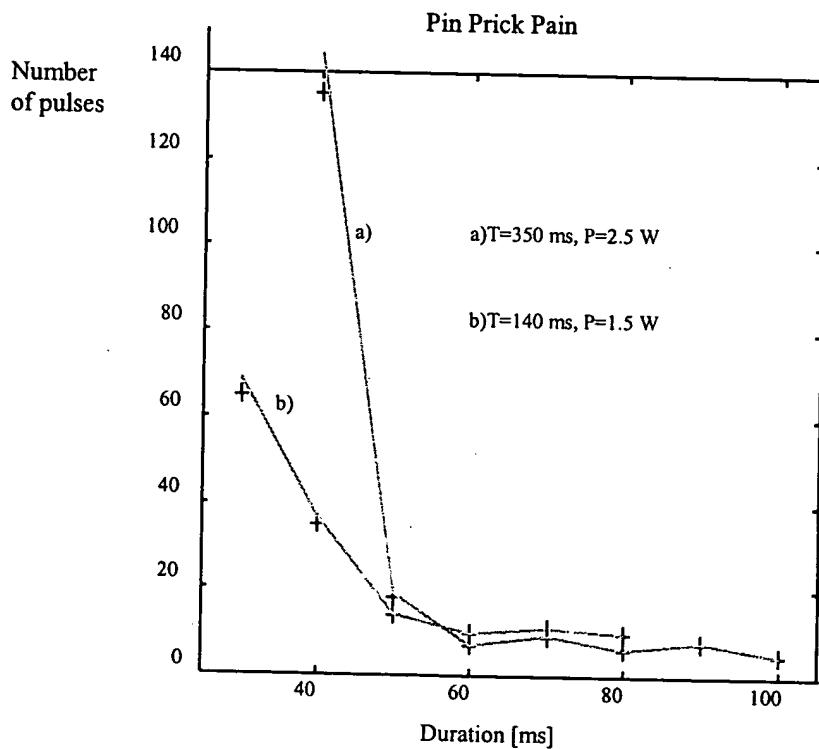


FIG. 13

Burning/Hot Pain (accumulation), T=800 ms, P=2.5W

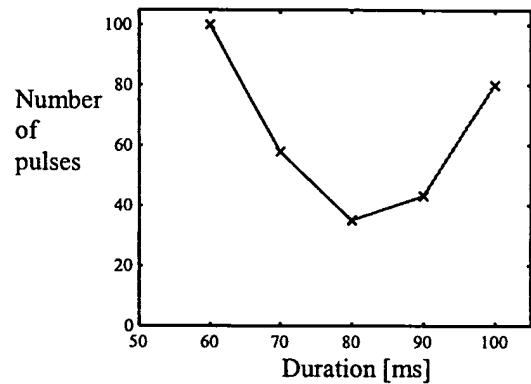
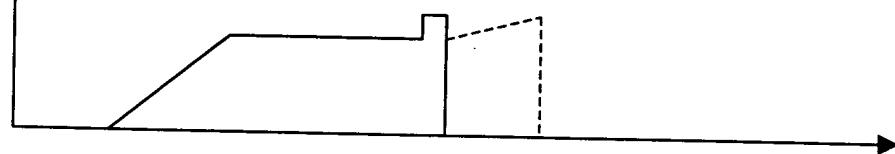


FIG. 14

Power, W

FIG. 15A



Temperature

40 C, threshold

FIG. 15B

Time

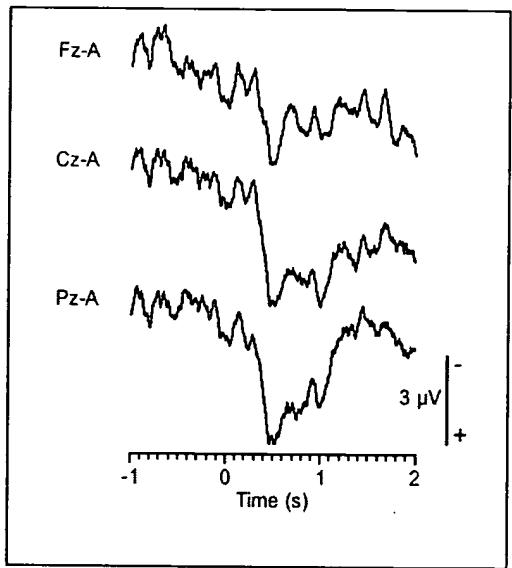


FIG. 16A

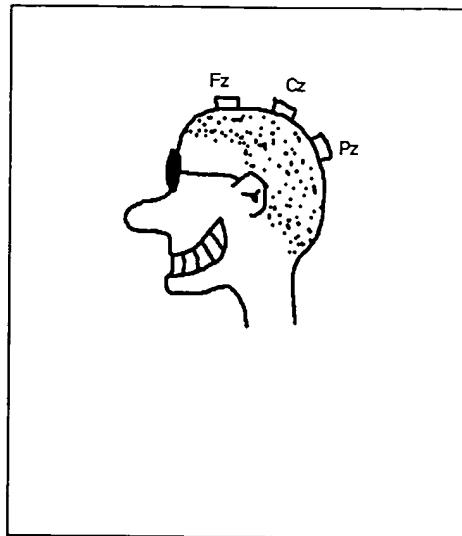


FIG. 16B

